

AMENDMENTS TO THE CLAIMS

Please amend the claims as indicated hereafter.

1. (Previously amended) A sacrificial composition of matter that decomposes to form air-regions, the sacrificial composition comprising:

a sacrificial polymer that undergoes acid-catalyzed decomposition, wherein the sacrificial polymer is chosen from polypropylene carbonate (PPC), polyethylene carbonate (PEC), polycyclohexane carbonate (PCC), polycyclohexanepropylene carbonate (PCPC), polynorbornene carbonate (PNC), a copolymer of polynorbornene and polynorbornene carbonate, and combinations thereof; and

a catalytic amount of a photoacid generator, wherein the photoacid generator is chosen from a nucleophilic halogenide, a complex metal halide anion, and combinations thereof.

2. (Original) The composition of matter of claim 1, wherein the composition decomposes at a temperature range from about 100 to 120 °C.

3. (Original) The composition of matter of claim 1, wherein the composition decomposes at a temperature range from about 175 to 200 °C.

4. (Previously amended) The composition of matter of claim 1, wherein the composition decomposes at a temperature range from about 100 to 120 °C and leaves substantially no solid residue either from the polymer or the photoacid generator (PAG).

5. (Original) The composition of matter of claim 1, wherein the composition decomposes at a temperature range from about 100 to 120 °C after exposure to ultraviolet (UV) radiation.

6. (Original) The composition of matter of claim 1, wherein the composition acts as an adhesive.

7. (Original) The composition of matter of claim 1, wherein the composition is a positive tone sacrificial material.

8. - 10. (Canceled)

11. (Original) The composition of matter of claim 1, wherein the photoacid generator is chosen from a diphenyliodonium salt, a triphenylsulfonium salt, a diphenylfluoronium salt, and combinations thereof.

12. (Previously Amended) The composition of matter of claim 1, wherein the photoacid generator is chosen from tetrakis(pentafluorophenyl)borate-4-methylphenyl[4-(1-methylethyl)phenyl] iodonium (DPI-TPFPB), tris(4-t-butylphenyl)sulfonium tetrakis(pentafluorophenyl)borate (TTBPS-TPFPB), tris(4-t-butylphenyl)sulfonium hexafluorophosphate (TTBPS-HFP), triphenylsulfonium triflate (TPS-Tf), bis(4-tert-butylphenyl)iodonium triflate (DTBPI-Tf), triazine (TAZ-101), triphenylsulfonium hexafluoroantimonate (TPS-103), triphenylsulfonium bis(perfluoromethanesulfonyl) imide (TPS-N1), di-(p-t-butyl)phenyliodonium bis(perfluoromethanesulfonyl) imide (DTBPI-N1), triphenylsulfonium

tris(perfluoromethanesulfonyl) methide (TPS-C1), di-(p-t-butylphenyl) iodonium,
tris(perfluoromethanesulfonyl)methide (DTBPI-C1), and combinations thereof.

13. (Original) The composition of claim 1, wherein the sacrificial polymer is about 1 to 50% by weight percent of the composition, and wherein the photoacid generator is from about 0.5 to 5% by weight of the composition.

14. – 31. (Cancelled)